

WHAT IS CLAIMED IS:

1. A movable wall system for use in buildings, said movable wall system comprising:

a plurality of movable panels;

a runner rail structure along which said plurality of movable panels runs;

each of said panels comprising at least one suspension device to suspend each of said panels from said runner rail structure;

said runner rail structure comprising a sole running surface;

said at least one suspension device of each of said panels comprising:

a runner roller;

said runner roller being configured and disposed to run on said sole running surface to permit movement of each of said panels;

a guide roller; and

said guide roller being configured and disposed to guide said suspension device in said runner rail structure; said runner rail structure further comprising:

a main track section;

a first track extension;

a second track extension;

said main track section being joined with said first track extension at a junction area to permit at least one of said panels to travel between said main track section and said first track extension;

said main track section being separated from said second track extension by a gap at said junction area;

a mechanical track-switching arrangement being disposed adjacent said gap and being configured to be in one of: an actuated position and a non-actuated position;

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said non-actuated position being the position in which said track-switching arrangement does not bridge said gap between said main track section and said second track extension to permit at least one of said panels to travel between said main track section and said first track extension and to not permit said at least one of said panels to travel between said main track section and said second track extension;

said actuated position being the position in which said track-switching arrangement bridges said gap between said main track section and said second track extension to permit said at least one of said panels to travel between said main track section and said second track extension and to not permit at least one of said panels to travel between said main track section and said first track extension;

said mechanical track-switching arrangement comprising:

a track portion being disposed a distance from said gap upon said mechanical track-switching arrangement being in said non-actuated position to not permit at least one of said panels to travel between said main track section and said second track extension;

said track portion being configured to be pivoted into said gap to connect said main track section and said second track extension, and to bypass said first track extension upon said mechanical track-switching arrangement being actuated to permit at least one of said panels to travel between said main track section and said second track extension;

said track portion being the sole track portion in said mechanical track-switching arrangement configured to bridge said gap to permit at least one of said panels to travel between said main track section and

said second track extension; and
a mechanical contact piece being configured and
disposed to be one of (a) and (b):

(a) contacted by said guide roller to actuate
said mechanical track-switching arrangement to
pivot said sole track portion into said gap to
connect said main track section and said second
track extension, and to bypass said first track
extension to permit at least one of said panels to
travel between said main track section and said
second track extension; and

(b) not contacted by said guide roller to not
actuate said track-switching arrangement to permit
at least one of said panels to travel between said
main track section and said first track extension;
and

said guide roller of said at least one suspension device
being configured and disposed to one of (a) and (b):

(a) contact said mechanical contact piece upon said at
least one suspension device entering said junction area to
actuate said mechanical track-switching arrangement to pivot
said sole track portion into said gap to connect said main
track section and said second track extension, and to bypass
said first track extension to permit at least one of said
panels to travel between said main track section and said
second track extension; and

(b) not contact said mechanical contact piece upon said
at least one suspension device entering said junction area
to not actuate said track-switching arrangement to permit at
least one of said panels to travel between said main track
section and said first track extension.

2. A movable wall system for use in buildings, said movable
wall system comprising:

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a plurality of movable panels;
a runner rail structure;
each of said panels comprising at least one suspension device to suspend each of said panels from said runner rail structure;
said at least one suspension device comprising a runner roller;
said runner roller being configured and disposed to run on said runner rail structure to permit movement of each of said panels;
said runner rail structure further comprising:
a first track section;
a second track section;
a third track section;
said first track section being joined with said second track section at a junction area;
said first track section being separated from said third track section by a gap at said junction area;
a track-switching arrangement being configured and disposed to be actuated to bridge said gap to permit at least one of said panels to travel between said first track section and said third track section; and
said track-switching arrangement comprising:
a non-rotating, movable track portion comprising one of: a pivotable track and a translatable track;
said non-rotating, movable track portion being configured and disposed to be moved into said gap to connect said first track section and said third track section, and to bypass said second track section; and
a mechanical switch being configured and disposed to be actuated to move said non-rotating, movable track portion into said gap; and
said at least one suspension device comprising a contact

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structure;

said contact structure of said at least one suspension device being one of:

disposed to contact and actuate said mechanical switch upon said at least one suspension device entering said junction area to permit said at least one suspension device to travel between said first track section and said third track section; and

disposed not to contact said mechanical switch upon said at least one suspension device entering said junction area to permit said at least one suspension device to travel between said first track section and said second track section.

3. The movable wall system according to Claim 2, wherein said mechanical switch comprises a rigid bent intermediate piece, attached to the ends of which are flexible switching points.

4. The movable wall system according to Claim 3, wherein the flexibility of said switching points is achieved by spring steel sheets.

5. The movable wall system according to Claim 2, wherein said intermediate piece is connected to a connecting piece, which is configured to execute a relative movement at right angles to said runner rail.

6. The movable wall system according to Claim 3, wherein said intermediate piece is connected to a connecting piece, which is configured to execute a relative movement at right angles to said runner rail.

7. The movable wall system according to Claim 5, wherein on the end of the connecting piece there are spacers that can be rotated in the manner of a parallelogram and which are simultaneously mounted rotationally on another connecting piece, which is fastened in a stationary fashion to the first track section and third track section.

8. The movable wall system according to Claim 6, wherein on the end of the connecting piece there are first and second spacers that can be rotated in the manner of a parallelogram and which are simultaneously mounted rotationally on another connecting piece, which is fastened in a stationary fashion to the first track section and third track section.

9. The movable wall system according to Claim 7, wherein the first spacer is longer than the second spacer and on its free end holds the movable track portion.

10. The movable wall system according to Claim 8, wherein the first spacer is longer than the second spacer and on its free end holds the movable track portion.

11. Runner rail for a movable wall that comprises a plurality of panels (1), each panel (1) of which is mounted by means of at least one suspension device (5, 6) having a guide roller (32) associated with a runner rail (2, 16) so that it can move in the runner rail (2, 16), with at least one running surface (26), on which the runner rollers (48) lie, with lateral guidance means for the suspension device (5, 6) or parts thereof, by which the runner rollers (48) are held in the running surface (26) in the direction of movement, with at least one junction at which the suspension device(5, 6) of the panel (1) is steered in a predetermined manner into a direction of movement on the running surface (26), characterized by the fact that the truck (4) has only one carrier roller (48) and one guidance roller (23, 32), and that the guide roller (23, 32) actuates a junction in the form of a switchable switch which has a pivoting running surface (10) for the carrier roller (48).

12. The runner rail as claimed in Claim 11, characterized by the fact that the guide roller (23, 32) actuates a switching piece (47) to pivot a running surface (10).

13. Runner rail as claimed in Claim 12, characterized by the fact that the switching piece (13) comprises a rigid bent

intermediate piece (13), attached to the ends of which are flexible switching points (9) and (24).

14. Runner rail as claimed in Claim 13, characterized by the fact that the flexibility is achieved by spring steel sheets (7) and (14).

15. Runner rail as claimed in Claim 14, characterized by the fact that the switching piece (47) is connected to a connecting piece (11, 43), which executes a relative movement at right angles to the runner rail (2).

16. Runner rail as claimed in Claim 13, characterized by the fact that the switching piece (47) is connected to a connecting piece (11, 43), which executes a relative movement at right angles to the runner rail (2).

17. Runner rail as claimed in Claim 15, characterized by the fact that on the end of the connecting piece (43) there are spacers (35) and (27) that can be rotated in the manner of a parallelogram and which are simultaneously mounted rotationally on a connecting piece (11), which is fastened in a stationary fashion to the runner rails (2) and (16).

18. Runner rail as claimed in Claim 16, characterized by the fact that on the end of the connecting piece (43) there are spacers (35) and (27) that can be rotated in the manner of a parallelogram and which are simultaneously mounted rotationally on a connecting piece (11), which is fastened in a stationary fashion to the runner rails (2) and (16).

19. Runner rail as claimed in Claim 17, characterized by the fact that the spacer (27) is longer than the spacer (35) and on its free end holds the pivoting running surface (10).

20. Runner rail as claimed in Claim 18, characterized by the fact that the spacer (27) is longer than the spacer (35) and on its free end holds the pivoting running surface (10).

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